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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/656,130	09/06/2000	Paul V. Hillier	PHB 34, 387	9190

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PHILIPS INTELLECTUAL PROPERTY & STANDARDS
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EXAMINER
PHUNKULH, BOB A

ART UNIT	PAPER NUMBER
2661	

DATE MAILED: 04/23/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
Office Action Summary	09/656,130	HILLIER ET AL.
	Examiner	Art Unit
	Bob A. Phunkulh	2661

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) FROM
THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed
  after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any
  earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *05 March 2004*.

2a)☒ This action is **FINAL**.　　　2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is
closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-7 and 9-17* is/are pending in the application.

　　4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,2,5-7,9-14,16 and 17* is/are rejected.

7)☒ Claim(s) *3,4 and 15* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

　　Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

　　Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

　　a)☒ All　b)☐ Some * c)☐ None of:

　　　1.☒ Certified copies of the priority documents have been received.

　　　2.☐ Certified copies of the priority documents have been received in Application No. _____.

　　　3.☐ Copies of the certified copies of the priority documents have been received in this National Stage
　　　　application from the International Bureau (PCT Rule 17.2(a)).

　　* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☐ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ .

5)☐ Notice of Informal Patent Application (PTO-152)

6)☐ Other: _____.

DETAILED ACTION

This communication is in response to applicant's 03/05/2004

amendment/responses in the application of **Hillier et al.** for "**Clustered Network**

Devices" filed 02/12/1998.   The amendments/response to the claims have been

entered.   Claim 8 has been canceled.   Claims 9-17 have been added. Claims 1-7, 9-

17 are now pending.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that

form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-2, 5-6, 9-14, 16-17, are rejected under 35 U.S.C. 102(b) as being

anticipated by Saito et al. (EP 0837579 A2), hereinafter Saito.

Regarding claim 1 , Saito discloses a local communication system comprising:

-a first cluster of devices interconnected for the communication of

messages via a first data bus and in accordance with a first set of

communication protocols (ROOM A using 1394 protocol, see figure 1);

-a second cluster of devices interconnected for the communication of

messages via a second data bus and in accordance with said first set of

communication protocols (ROOM B also using 1394 protocol, see figure 1); and

     -a datachannel linking a device of said first cluster (1st half gateway 3) and a device of said second cluster (2nd half gateway 4), said data channel supporting communication of messages in accordance with a second set of communications protocols (channel link 32, see figure 8);

     -wherein a device of the first cluster (AV control terminal 2) holds a stored software representation of operational features of a selected device of the second cluster and any device of the first cluster wishing to interact with said selected device instead interacts with said stored representation (col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

     Regarding claim 2, Saito discloses the stored representation is generated by said selected device and transmitted via said data channel to said device of the first cluster (col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

     Regarding claim 5, Saito discloses the stored representation models said selected device as if it were a device of the first cluster (col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

     Regarding claim 6, Saito discloses the device of the first cluster holding the stored representation is that device of the first cluster to which the data channel is connected (col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

Regarding claim 9, Saito discloses the software representation of operational features of the selected device of the second cluster represents a control system of the selected device (on each of the AV control terminal 2 and 5, a "video transmission and reception control application" is implemented, and see their functions in col. 20 lines 48 to col. 21 line 12; and col. 22 lines 56 to col. 23 line 9).

Regarding claim 10,   Saito discloses the software representation of operational features of the selected device of the second cluster comprises a Device Control Module for the selected device (the control terminal can collect various **can collect various information regarding AV devices which are connected with a network to which the other AV control terminal belongs, such as what AV devices there are, what contents they have, how many media they have, what 1394 addresses they have, etc.**, in addition to the information regarding AV devices on the 1394 bus to which it belongs, on the table of Fig. 6. The collected various information for each AV devices presents a Device Control Module for the selected device, see and col. 22 lines 56 to col. 23 line 9).

Regarding claim 11, Saito discloses the software representation of operational features of the selected device of the second cluster is executed on said device of the first cluster wishing to interact with said selected device (col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

Regarding claim 12, Saito discloses the selected device of the second cluster is
a video recorder and the device of the first cluster executing the software representation
of the selected device is a set top box (AV control 2 or 5) (can be any one of these
devices, see figure 7).

Regarding claim 13, Saito discloses a communication system comprising

a first data bus operating in accordance with a first set of communication

protocols (ROOM A having 1st IEEE 1394 bus operating in IEEE 1394 protocol, see

figure 1),

a second data bus also operating in accordance with the first set of

communication protocols (ROOM a having 2nd IEEE 1394 bus operating in IEEE 1394

protocol, see figure 1), and

a data channel linking the first data bus and the second data bus and supporting

communication of messages between the first and second data buses in accordance

with a second set of communications protocols (channel link 32, see figure 8) ,

a first device comprising (the 1st AV control terminal, see figure 1):

means for communicating via said data channel; and

means for storing a software representation of operational features of a

second device which is connected to a different one of the data buses

than a one of the data buses to which the first device is connected (the AV

control terminal 2 or 5 includes means for storing the table and other

information, see figure 6 and col. 22 line 38 to col. 23 line 9).

Regarding claim 14, Saito discloses a communication system comprising:

a first cluster of devices interconnected via a first data bus and adapted to

communicate in accordance with a first set of communication protocols (the transmitting

terminals, AV control terminal 2, 1st half way gateway 3; and 1st IEEE 1394 bus in room

A);

a second cluster of devices interconnected via a second data bus and adapted to

communicate in accordance with said first set of communication protocols (the receiving

terminals, AV control terminal 5, 2nd half way gateway 4; and 2nd IEEE 1394 bus in room

B, see figure 1); and

a data channel linking said first data bus and said second data bus, said data

channel adapted to support communication of messages between the first and second

clusters in accordance with a second set of communications protocols (channel link 32,

see figure 8);

wherein a first device of the first cluster stores a software representation of

operational features of a selected device of the second cluster, permitting a second

device of the first cluster to control the selected device by executing the software

representation (the second device of the first cluster i.e. DVD player in room A, controls

the selected device i.e. TV of room B in correlation with information stored in AV control

terminal 2 or 5, col. 20 lines 48 to col. 21 line 12; col. 22 lines 56 to col. 23 line 9; and figure 6).

Regarding claim 16, Saito discloses the software representation of operational features of the selected device of the second cluster comprises a Device Control Module for the selected device (the control terminal can collect various **can collect various information regarding AV devices which are connected with a network to which the other AV control terminal belongs, such as what AV devices there are, what contents they have, how many media they have, what 1394 addresses they have, etc.**, in addition to the information regarding AV devices on the 1394 bus to which it belongs, on the table of Fig. 6. The collected various information for each AV devices presents a Device Control Module for the selected device, see and col. 22 lines 56 to col. 23 line 9).

Regarding claim 17, the selected device of the second cluster is a video recorder and the device of the first cluster executing the software representation of the selected device is a set top box (AV control 2 function as the set top box for the TVs) (can be any one of these devices, see figure 7).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Saito.

Regarding claim 7, Saito fails to explicitly disclose data channel is a wireless link.

However it would have been obvious to one having ordinary skill in the art at the time of invention was made to replace the ATM network with a wireless network (i.e. BLUETOOTH) in order to provide more flexibility of configuring the network within a limited location.

Allowable Subject Matter

Claims 3-4, 15 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

Applicant's arguments filed 3/5/2004 have been fully considered but they are not persuasive.

In page 7, the applicant argued that following:

Applicants respectfully submit that Saito does not disclose a system including this feature. The Office Action cited FIGs. 1 and 2 as supposedly showing all of the features of claim 1. Saito teaches that the AV control terminals 2, 5 in FIG. 1 store attribute information regarding devices of the other cluster. However, Saito does not teach that the control terminals 2, 5 store any software representation of

operation features of devices of the other cluster. In that regard, inspection of the table in FIG. 6 of Saito indicates that the AV control terminals 2 and 5 only store general attributes of a device on the other cluster (e.g., "DVD Player, "TV, " etc.). Saito does not teach that the AV control terminals store an actual software representation (e.g., a Device Control Module) of operation features of devices connected to the other cluster that might, for example, permit a device in the first cluster to actually control a device in the second cluster.

In this regard, for example, Saito teaches that when a user in one location wants to receive video from a selected device on a cluster at a different location, the user has to operate a first AV control terminal associated with the cluster at the user's location. This first AV control terminal then communicates with a second AV control terminal that belongs to the same cluster as the selected device. It is that second AV control terminal which then is able to actually transmit an instruction to the selected device. Evidently, the first AV control device does not possess any software representation of operation features of the selected device that would enable it to interact with and control the selected device. This is consistent with the teaching of Saito that the AV control terminal only stores general attributes of devices on another cluster, and does not possess any software representation of operation features of the devices.

In response to the above argument, Saito discloses in col. 22 line 52 to col. 23 line 9:

The AV control terminal 2 and 5 exchange the collected information with each other (step S6). For this information exchange, each one transmits the collected information to the IP address of the other by using IP packets. As a result, in each AV control terminal 2, 5, a table with contents as shown in Fig. 6 is produced, for example. **Namely by carrying out this information exchange between the AV control terminals 2 and 5, each AV control terminal 2, 5 can collect various information regarding AV devices which are connected with a network to which the other AV control terminal belongs, such as what AV devices there are, what contents they have, how many media they have, what 1394 addresses they have, etc.,** in addition to the information regarding AV devices on the 1394 bus to which it belongs, on the table of Fig. 6.

Saito discloses **more than general attributes** of a device on the other cluster (e.g. DVD player, TV, etc.) suggested by the applicant. The control terminal can collect various **can collect various information regarding AV devices which are connected with a network to which the other AV control terminal belongs, such as what AV devices there are, what contents they have, how many media they have, what 1394 addresses they have, etc.,** in addition to the information regarding AV devices on the 1394 bus to which it belongs, on the table of Fig. 6.

Also, each the AV control terminals is implemented with a "video transmission and reception control application." The application having functions described in col. 20 line 48 to col. 21 line 12.

Therefore, Saito discloses a device on the first cluster holds a stored software representation of operational feature of a selected device of the second cluster.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any response to this final action should be mailed to:

Box AF

Commissioner of Patents and Trademarks

Washington, D.C. 20231

Or faxed to:

(703) 872-9314, (for formal communications; please mark "EXPEDITED

PROCEDURE")

Or:

Hand-delivered responses should be brought to Crystal Park II, 2021 Crystal

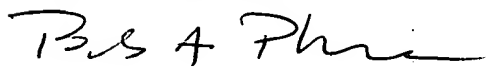Drive, Arlington, VA., Sixth Floor (Receptionist).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Bob A. Phunkulh** whose telephone number is **(703) 308-8251**. The examiner can normally be reached on Monday-Friday from 7:00 A.M. to 4:00 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor **Douglas W. Olms**, can be reach on **(703) 305-4703**. The fax phone number for this group is **(703) 872-9314**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Bob A. Phunkulh

April 22, 2004
T.C. 2600
Art Unit 2661